

**MISSOURI**  
DEPARTMENT OF  
NATURAL RESOURCES

## Total Maximum Daily Load Information Sheet

### Salt Pine Creek

**Water Body ID: 2113**

---

#### Water Body Segment at a Glance:

**County:** Washington  
**Nearby City:** Potosi  
**Length:** 1.2 miles  
**Watershed Size:** 1.9 square miles  
**Pollutant:** Aquatic macroinvertebrate bioassessments  
**Source:** Barite tailings pond



Statewide Map Showing Location of Watershed

#### Scheduled for TMDL development:

TMDL development schedules are subject to change.

The most current schedule for TMDL development is available on the department's website at [dnr.mo.gov/env/wpp/tmdl/wpc-tmdl-progress.htm](http://dnr.mo.gov/env/wpp/tmdl/wpc-tmdl-progress.htm)

---

### Description of the Problem

A water body is considered impaired when it fails to meet applicable water quality standards. Water quality standards consist of designated uses, water quality criteria, an antidegradation policy and implementation procedures. Salt Pine Creek is impaired due to exceedances of water quality criteria for the protection of aquatic life.

#### Designated uses of Salt Pine Creek\*

- Warm Water Habitat (WWH)
- Whole Body Contact Recreation Category B (WBC-B)
- Secondary Contact Recreation (SCR)
- Human Health Protection (HHP)
- Irrigation (IRR)
- Livestock and Wildlife Protection (LWP)

\*In addition to these specific uses, all waters of the state are protected by the general water quality criteria that are specified in the state's Water Quality Standards at 10 CSR 20-7.031(4).

#### Designated use that is impaired

- Warm Water Habitat (WWH)
- General criteria

**Criteria that apply**

The state's general water quality criteria at 10 CSR 20-7.031(4) are applicable to all waters of the state at all times. No water contaminant, by itself or in combination with other substances, shall prevent the waters of the state from meeting the following conditions:

- Waters shall be free from substances or conditions in sufficient amounts to result in toxicity to human, animal, or aquatic life [10 CSR 20-7.031(4)(D)].
- Waters shall be free from physical, chemical, or hydrologic changes that would impair the natural biological community [10 CSR 20-7.031(4)(G)].

**Background information and water quality data**

Salt Pine Creek is a small rural stream in Washington County and is a tributary to Old Mines Creek. Aquatic invertebrate samples were collected from Salt Pine Creek in 2008 and 2009. These samples were analyzed and a score was determined to indicate the health of the aquatic community based on the numbers and types of species present. Scores less than 16 indicate an impaired condition, which may be caused by toxicity or habitat issues within the waterway. Invertebrate communities are judged to be impaired if the percent of sampling sites receiving a score of 16 or more is significantly less than for reference streams within the same ecological drainage unit. If there are seven or fewer samples, as in the case of Salt Pine Creek, the department judges a stream as impaired if at least 75 percent of the samples score less than 16. For Salt Pine Creek, both samples collected scored less than 16. It is suspected that metals toxicity, due to mining, is responsible for the impaired aquatic invertebrate community.

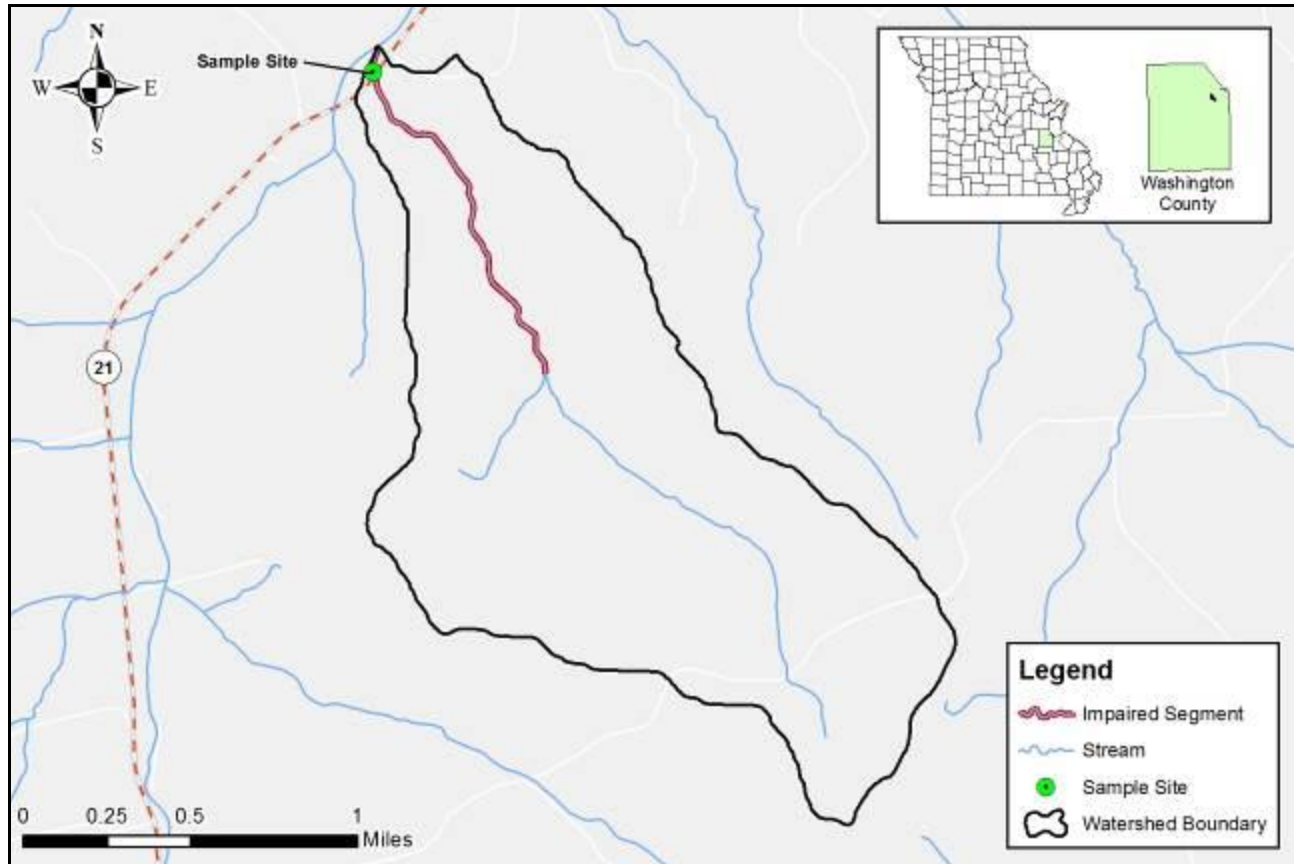
**Aquatic Invertebrate Monitoring Data**

<i>Sampling Organization</i>	<i>Sampling Location</i>	<i>Date</i>	<i>Score</i>
MoDNR	Highway 21 crossing	Fall 2008	12
MoDNR	Highway 21 crossing	Spring 2009	14

**TMDL for Salt Pine Creek**

The Salt Pine Creek TMDL will calculate the maximum amount of each listed pollutant that the stream can receive and still meet water quality standards. The TMDL will also identify all potential or suspected pollutant sources in the watershed and distribute the allowable pollutant loads among those various sources. When developed, the Salt Pine Creek TMDL will use the most current and available data. For this reason, the final TMDL may present information that differs from that contained in this information sheet.

## Map of the Salt Pine Creek watershed



### For more information call or write:

Department of Natural Resources  
Water Protection Program – Watershed Protection Section  
P.O. Box 176  
Jefferson City, MO 65102-0176  
Ph: 1-800-361-4827 or 573-751-1300  
Fax: 573-526-6802  
Email: [TMDL@dnr.mo.gov](mailto:TMDL@dnr.mo.gov)  
Program Home Page: [dnr.mo.gov/env/wpp/index.html](http://dnr.mo.gov/env/wpp/index.html)